WO 2005/041676 PCT/EP2004/009560

21

Claims

- 1) Process for the preparation of a water continuous acidified emulsion comprising 15 to 50 wt% of a partly crystalline fat and 1 to 6 wt% protein, wherein the process comprises the sequence of
 - a) homogenising at a temperature below 60°C, a water continuous emulsion comprising a partly crystalline fat and protein wherein the percentage of denatured protein on total protein is less than 100-(2.6 * a/b), wherein a is the amount of fat on the total product in wt% and b is the amount of total protein on the product in wt%,
 - b) heating to a temperature above 80°C for a time longer than 5 minutes, and
 - c) acidifying to a pH below the pH of gelling of the protein having the highest pH of gelling in the emulsion.
- 2) Process according to claim 1 wherein the emulsion comprises 15 to 25 wt% of a partly crystalline fat and 2 to 3 wt% protein, wherein the process comprises the sequence of
 - a) homogenising at a temperature below 60°C, a water continuous emulsion comprising a partly crystalline fat and protein wherein the percentage of denatured protein on total protein is less than 67 %,
 - b) heating to a temperature above 85°C for a time longer than 10 minutes, and
 - c) acidifying to a pH below the pH of gelling of the protein having the highest pH of gelling in the emulsion.

WO 2005/041676 PCT/EP2004/009560

22

- 3) Process according to claim 1 or 2 wherein the emulsion before homogenisation is prepared by mixing fat and protein, in an aqueous phase.
- 4) Process for the preparation of a water continuous acidified emulsion comprising 15 to 50 wt% partly crystalline fat and 1 to 6 wt% protein, wherein the process comprises the sequence of
 - a) homogenising at a temperature below 60°C, a water continuous emulsion comprising fat and protein wherein the percentage of denatured protein is less than 20% on total protein.
 - b) heating to a temperature and for sufficient time to prepare an emulsion wherein the percentage of denatured protein is more than 20% on total protein and
 - c) acidifying to a pH below the pH of gelling of the protein having the highest pH of gelling in the emulsion.
- 5) Process according to claim 4 wherein the emulsion before homogenisation is prepared by mixing fat and protein, in an aqueous phase where the percentage of denatured protein is less than 20% on total protein.
- 6) Process according to any of claim 1 to 5 wherein the fat is a vegetable fat.
- 7) Process-according to any of claim 1 to 6, wherein the partially crystalline fat has a fatty acid composition wherein the combined amount of HM2, M3, MSh2, M2Sh, and HMSh is at least 46 wt% and the amount of U3 is less than 28 wt%, and the combined amount of U3 and H2U is less than 30 wt%, based on total fatty acids.

WO 2005/041676 PCT/EP2004/009560

23

- 8) Process according to claim 7 wherein the partly crystalline fat comprises least 50 wt% of fully hardened coconut fat or at least 55 wt% of fully hardened palm kernel oil or combinations of x wt% of fully hardened coconut fat and y wt% of fully hardened palm kernel oil, wherein x + (50/55)y is at least 50, based on weight of fat.
- 9) Process according to any of claim 1 to 8 wherein the product of step (b) is acidified in step (c) to a pH in the range of 5.8 to 3.8.
- 10) A water continuous acidified emulsion obtainable by the process according to any of claims 1 to 9.
- 11) A process according to any of claims 1 to 9 or a product according to claim 10 wherein the protein is a whey protein.